Amendments to the Claims:

No claims were amended herein. The claims and their status are shown below.

1. (Original) A method of monitoring the proliferation of cultured prostate cancer cells in the presence of one or more NSAIDs, comprising:

contacting the prostate cancer cells with one or more NSAIDs; and

determining the level of expression, the transactivating ability, and/or the IL6-mediated activation of an androgen receptor,

wherein a decrease in the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor indicates an inhibitory effect by the NSAID on the proliferation of the prostate cancer cells.

2. (Original) The method of claim 1, wherein the one or more NSAIDs is celecoxib and/or nimesulide.

3. (Original) A method of treating an individual with prostate cancer or at risk of developing prostate cancer, comprising:

identifying an individual with prostate cancer or at risk of developing prostate cancer; and

administering a dose of one or more NSAID to the individual in an amount effective to inhibit expression, transactivating ability, and/or IL6-mediated activation of an androgen receptor,

wherein an inhibition of the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor inhibits the proliferation of prostate cancer cells, thereby treating the individual.

4. (Original) The method of claim 3, wherein the effective dose is from about 10 mg/kg to about 300 mg/kg.

5. (Original) The method of claim 3, wherein the one or more NSAIDs is celecoxib and/or nimesulide.

6. (Original) The method of claim 3, wherein the individual is human.

7. (Original) The method of claim 3, wherein the administration is selected from the group consisting of orally, transdermally, intravenously, intraperitoneally, or using an implant.

8. (Original) The method of claim 3, further comprising:

monitoring the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor in the individual.

9. (Original) The method of claim 3, further comprising:

monitoring the individual for a dose-dependent reduction in prostate-specific antigen (PSA) levels,

wherein a dose-dependent reduction in PSA correlates with a dose-dependent decrease in the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor.

10. (Original) The method of claim 9, further comprosing:

adjusting, if necessary, the dose of the one or more NSAIDs to achieve or maintain the dose-dependent reduction in PSA.

11. (Original) The method of claim 3, further comprising:

monitoring the individual for a reduction in human glandular kallikrein (hK2) levels, wherein a reduction in hK2 correlates with a decrease in the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor.

12. (Original) The method of claim 11, further comprising:

adjusting, if necessary, the does of the one or more NSAIDs to achieve or maintain the reduction in hK2.

13. (Original) A method of reducing the risk of recurrence of prostate cancer in an individual, wherein the individual previously had been treated for prostate cancer, comprising:

administering a dose of one or more NSAIDs to the individual in an amount effective to inhibit expression, transactivating ability, and/or IL6-mediated activation of an androgen receptor,

wherein inhibiting the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor inhibits the proliferation of prostate cancer cells, thereby reducing the risk of recurrence of prostate cancer in the individual.

14. (Original) The method of claim 13, wherein the one or more NSAIDs is celecoxib and/or nimesulide.

15. (Original) The method of claim 13, further comprising:

monitoring the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor in the individual.

16. (Original) The method of claim 13, further comprising:

monitoring the individual for a dose-dependent reduction in prostate-specific antigen (PSA) levels,

wherein a dose-dependent reduction in PSA correlates with a dose-dependent decrease in the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor.

17. (Original) The method of claim 16, further comprising:

adjusting, if necessary, the dose of the one or more NSAIDs to achieve or maintain the dose-dependent reduction in PSA.

18. (Original) The method of claim 13, further comprising:

monitoring the individual for a reduction in human glandular kallikrein (hK2) levels, wherein a reduction in hK2 correlates with a decrease in the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor.

19. (Original) The method of claim 18, further comprising:

adjusting, if necessary, the does of the one or more NSAIDs to achieve or maintain the reduction in hK2.

20. (Original) The method of claim 13, wherein the previous treatment for prostate cancer in the individual comprised a radical prostectomy.

21. (Original) A method of treating an individual with benign prostatic hyperplasia (BPH) or at risk of developing BPH, comprising:

identifying an individual with BPH; and

administering a dose of one or more NSAIDs to the individual in an amount effective to inhibit expression, transactivating ability, and/or IL6-mediated activation of an androgen receptor,

thereby treating the individual.

22. (Original) The method of claim 21, wherein the one or more NSAIDs is celecoxib and/or nimesulide.

23. (Original) The method of claim 21, further comprising:

monitoring the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor in the individual.

24. (Original) The method of claim 21, further comprising:

monitoring the individual for a dose-dependent reduction in prostate-specific antigen (PSA) levels,

wherein a dose-dependent reduction in PSA correlates with a dose-dependent decrease in the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor.

25. (Original) The method of claim 24, further comprosing:

adjusting, if necessary, the dose of the one or more NSAIDs to achieve or maintain the dose-dependent reduction in PSA.

26. (Original) The method of claim 21, further comprising:

monitoring the individual for a reduction in human glandular kallikrein (hK2) levels, wherein a reduction in hK2 correlates with a decrease in the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor.

27. (Original) The method of claim 26, further comprising:

adjusting, if necessary, the does of the one or more NSAIDs to achieve or maintain the reduction in hK2.

28. (Original) A method of screening for compounds that inhibit the proliferation of prostate cancer cells, comprising:

contacting prostate cancer cells with a compound; and

determining the level of expression, the transactivating ability, and/or the IL6-mediated activation of an androgen receptor,

wherein decreased expression, transactivating ability, and/or IL6-mediated activation of the androgen receptor in the prostate cancer cells compared to prostate cancer cells not contacted with the compound indicates a compound that inhibits the proliferation of prostate cancer cells.

29. (Original) The method of claim 28, wherein the one or more NSAIDs is celecoxib and/or nimesulide.

30. (Original) A composition comprising:

one or more NSAIDs;

one or more compounds that has a mechanism of action selected from the group consisting of:

inhibiting expression of a gene encoding an androgen receptor,

inhibiting nuclear localization of an androgen receptor, and

inhibiting the transactivating ability of an androgen receptor; and

a pharmaceutically acceptable carrier.

31. (Original) The composition of claim 30, wherein the one or more NSAIDs is celecoxib and/or nimesulide.

32. (Original) The composition of claim 30 wherein the compound is selected from the group consisting of silymarin, silibin, docosahexaenoic acid (DHA), eicosapentaenoic acid (EPA), quercetin, perillyl alcohol (POH) or a derivative thereof, resveratrol, flufenamic acid, tea polyphenols, and anti-androgen compounds.

33. (Original) An article of manufacture comprising the composition of claim 30; and packaging material, wherein the packaging material comprises instructions for using the composition to inhibit expression, transactivating ability, and/or IL6-mediated activation of an androgen receptor in an individual.

34. (Original) The article of manufacture of claim 33, further comprising:

compositions for monitoring the expression, the transactivation, and/or the IL6-mediated activation of the androgen receptor.

35. (Original) The article of manufacture of claim 33, further comprising:

compositions for monitoring PSA.

36. (Original) The article of manufacture of claim 33, further comprising:

compositions for monitoring hK2.

37. (Original) A composition comprising one or more NSAIDs, wherein the one or more NSAIDs are formulated for transdermal delivery to the prostate of an individual, wherein delivery to the prostate inhibits the expression, the transactiavting ability, and/or the IL6-mediated activation of the androgen receptor.

38. (Original) The composition of claim 37, wherein the one or more NSAIDs is celecoxib and/or nimesulide.

39. (Original) A composition comprising one or more NSAIDs, wherein one or more NSAIDs are formulated for implantation near the prostate of an individual, wherein implantation near the prostate inhibits the expression, the transactivating ability, and/or the IL6-mediated activation of the androgen receptor.

40. (Original) The composition of claim 39, wherein the one or more NSAIDs is celecoxib and/or nimesulide.